BEFORE

THE PUBLIC SERVICE COMMISSION
OF

SOUTH CAROLINA

DOCKET NO. 2004-100-E

In RE: Application of Progress Energy Carolinas, Inc. for a Certificate of Environmental Compatibility and Public Convenience and Necessity for the Construction and Operation of Two New 230-kV Transmission Lines; Florence Substation to Marion Substation and Nichols Substation to Brunswick EMC's Peacock POD, near Chadbourn, North Carolina	APPLICATION FOR CERTIFICATE OF ENVIRONMENTAL COMPATIBILITY AND PUBLIC CONVENIENCE AND NECESSITY

Progress Energy Carolinas, Inc. ("PEC" or "Company") hereby applies to the South Carolina Public Service Commission ("Commission") for a Certificate of Environmental Compatibility and Public Convenience and Necessity to construct and operate two 230-kV transmission lines; the first from its Florence Transmission Substation near Florence, South Carolina to its Marion Transmission Substation near Marion, South Carolina and the second from its Nichols Transmission Substation near Nichols, South Carolina to the Brunswick Electric Membership Corporation's (EMC) Peacock Point of Delivery (POD) near Chadbourn, North Carolina. This application is filed pursuant to the provisions of S.C. Code Ann. §§ 58-33-10 et seq. (1976 & Cum. Supp. 2000).

In support of this application, PEC respectfully shows to the Commission:

1. **Applicant.** The Company's correct name and address is Progress Energy Carolinas, Inc., Post Office Box 1551, Raleigh, North Carolina 27602. PEC is a corporation duly organized and existing under the laws of the State of North Carolina,

and authorized to conduct business in South Carolina. Its principal office is located at 410 South Wilmington Street, Raleigh, North Carolina 27601. The Company is an electric utility primarily engaged in the business of generating, transmitting, delivering and furnishing electricity to the public for compensation.

2. Correspondence or Communications. The names, titles, address and telephone numbers of the attorneys for the applicant to whom correspondence or communications relating to the application should be addressed is as follows:

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3. Florence – Marion 230-kV Transmission Line Project Description.

NAME OF LINE: Florence Substation-Marion Substation 230-kV Transmission Line

EXTENDING FROM: Florence 230-kV Transmission Substation near Florence, South Carolina

TO: Marion 230-kV Transmission Substation near Marion, South Carolina

ESTIMATED LENGTH: 29 Miles

WIDTH OF RIGHT-OF-WAY: 70 to 100 Feet

DESIGN VOLTAGE: 230-kV

NORMAL CAPACITY: 628 MVA

CONDUCTOR: Single 1590 ACSR with one overhead ground wire

CONFIGURATION: Delta Horizontal Vee

TYPES OF STRUCTURES: Weathered steel, single-pole

NOMINAL HEIGHT: 100 feet

COUNTIES IN WHICH PROPOSED LINE IS LOCATED: Florence, Dillon, and Marion

MUNICIPALITIES IN CLOSE PROXIMITY TO THE PROPOSED LINE: Florence, Quinby, Sellers and Marion

NATIONAL OR STATE PARKS OR FORESTS DIRECTLY AFFECTED OR THE NEAREST FACILITY: None directly affected. Nearest is Little Pee Dee State Park Bay Heritage Preserve, approximately 12 miles northeast of project.

MAJOR WATERWAYS CROSSED: Great Pee Dee River

MAJOR HIGHWAYS: State Highway 327, US Highway 76, US Highway 301, US Highway 501 Bypass

COST: approximately $20,000,000

4. **Need and Necessity.** The existing transmission lines in the Florence-Marion area will overload by the summer of 2007 in response to continuing electric load growth coupled with certain critical generation and transmission conditions, resulting in a degradation of reliability to unacceptable levels. [The details and supporting documentation regarding system operation and peak load growth are contained in pages 2.1-2.3 of Exhibit B, the routing study and environmental report for this project]. This project will relieve the overloading in the existing corridor and will provide for long-term load growth in the Florence area, which is projected to increase approximately two to three percent each year for the next ten years.

5. Project Location. The origin of the first new transmission line will be the Florence Substation, located in northern Florence at 1200 North Douglas Street. The terminus of the new line is the Marion Substation, north of the City of Marion near U.S. Highway 501 Bypass.

The preferred route exits the Florence Substation to the north, parallel to several existing Progress Energy transmission lines and a gas pipeline. The preferred route turns east, away from the existing lines, crosses West Leggs Circle, and then continues north, to a position parallel to an existing Progress Energy and non-Progress Energy line The preferred route then turns east, parallel to the existing lines across McIver Road and TV Road (State Highway 26). The route leaves the existing Progress Energy and non-Progress Energy transmission lines briefly and parallels a Santee Cooper line near Sand Pit Road, back to the existing Progress Energy transmission line, where the route turns and crosses South Carolina State Highway 327. Near the southeast corner of the Pee Dee Regional Commerce Center, the preferred route turns northeast, parallel to an existing Progress Energy line through the Pee Dee River Swamp and across the Great Pee Dee River. After crossing into Dillon County, the existing Progress Energy transmission line and preferred route turns east continuing to Gum Swamp Road. Near Gum Swamp Road, the preferred route turns southeast from the existing Progress Energy transmission line and parallels a non-Progress Energy transmission line southeast into Marion County, toward the City of Marion. As the preferred route approaches U.S. Highway 501 Bypass, it turns south away from the existing Progress Energy line and parallels the existing Progress Energy Florence-Marion 115-kV transmission line. The route then turns east to parallel the Progress Energy line across the U.S. Highway 501 Bypass and into the Marion Substation. A map of the proposed route is attached hereto as Exhibit A.

6. Environmental Assessment. Attached hereto and made a part hereof as Exhibit B, is the "Routing Study and Environmental Report for the Florence Substation-Marion Substation 230-kV Transmission Line Project" dated March 2004 and prepared by Burns & McDonnell Engineering Company, Inc.

The environmental report contains a summary of PEC's route selection process, public involvement activities, and the potential environmental impacts of the selected route and alternative routes studied, as well as mitigation measures and the resulting overall impact of the proposed transmission line. Appendices to the report include copies of agency correspondence, public involvement documentation, photographs of typical structures and supporting route analysis information.

In conducting the environmental assessment, PEC examined study areas encompassing approximately 202 square miles and examined 60 alternative route segments that could be combined to form 177 possible line routes.

An extensive inventory of natural and human resources, including topography, soils, hydrology, vegetation, wetlands, wildlife, threatened and endangered plant and animal species, land uses, cultural resources, population, employment and visual character was conducted within the study area.

Each of the alternative routes was evaluated against the potential social and environmental impact based in part on criteria established from the public workshops conducted by PEC.

The preferred route was selected because it would have the least overall social and environmental impact. The project parallels both existing transmission lines and gas pipelines, which reduces the required right-of-way and minimizes impacts to agricultural

land, woodland and wetlands. The preferred route also has minimal residential impacts compared to most of the other routes.

By following the Company's standard construction practices, the route selection processes described, and utilizing mitigation techniques, most of the potential impacts of the selected route will be either avoided or minimized. As a result, the construction and operation of the proposed project will have minimal effects on the natural and human resources within the study area.

7. Cultural Resources Assessment. For the Florence-Marion line a Burns & McDonnell archaeologist performed a records search at the South Carolina Institute of Archaeology and Anthropology, University of South Carolina. As explained in Exhibit B, the routing study and environmental report for this project, over 140 recorded archaeological sites, landmarks, and historical structures were identified within the study area. Only nine of these sites are either eligible or recommended to be eligible for the National Register of Historic Places (NRHP). An additional 28 sites are potentially eligible for inclusion on the NRHP. Five sites in the study area are listed on the NRHP. Most of the sites identified within the study area were clustered in areas where recent surveys had been recorded due to development (e.g., Roche Carolinas, Inc., Pee Dee Regional Commerce Center). None of the listed or eligible NRHP sites would be impacted by the selected route.

8. Marion-Whiteville 230-kV Transmission Line Project Description.

NAME OF LINE: Marion Substation-Whiteville Substation 230-kV Transmission Line

EXTENDING FROM: The proposed line will begin at an existing 230-kV line segment that originates at the Nichols 230-kV Transmission Substation near Nichols, South Carolina and extends approximately 1,000 feet east of the substation

TO: The proposed line will end and connect to an existing 230-kV line segment that currently terminates approximately 1,200 feet west of the Brunswick EMC Peacock POD, near Chadbourn, North Carolina

ESTIMATED LENGTH: 21 Miles (6.7 miles in South Carolina)

WIDTH OF RIGHT-OF-WAY: 85 to 100 Feet

DESIGN VOLTAGE: 230-kV

NORMAL CAPACITY: 628 MVA

CONDUCTOR: Single 1590 ACSR with one overhead ground wire

CONFIGURATION: Delta Horizontal Vee

TYPES OF STRUCTURES: Weathered steel, single-pole

NOMINAL HEIGHT: 100 feet

COUNTIES IN WHICH THE PROPOSED LINE IS LOCATED: Marion and Horry, South Carolina and Columbus County, North Carolina

MUNICIPALITIES IN CLOSE PROXIMITY TO THE PROPOSED LINE: Nichols, South Carolina

NATIONAL OR STATE PARKS OR FORESTS DIRECTLY AFFECTED OR THE NEAREST FACILITY: None directly affected. Nearest is Little Pee Dee State Park Bay Heritage Preserve, approximately 10 miles northwest of project.

MAJOR WATERWAYS CROSSED: Lumber River

MAJOR HIGHWAYS: US Highway 76, State Highway 904, State Highway 410

COST: approximately $17,200,000

9. **Need and Necessity.** The existing transmission lines in the Marion-Whiteville area will overload by the summer of 2007 in response to continuing electric load growth coupled with certain critical generation and transmission conditions, resulting in a degradation of reliability to unacceptable levels. [The details and supporting documentation regarding system operation and peak load growth are contained in pages

2.1 and 2.4 of Exhibit D, the routing study and environmental report for this project]. This project will relieve the overloading in the existing corridor and will provide for long-term load growth, which is projected to increase approximately two to three percent each year for the next ten years.

10. Project Location. The origin of this second new transmission line will be an existing 230-kV transmission line that terminates approximately 1,000 feet east of the Nichols Substation, which is located west of the Lumber River near Nichols, South Carolina. The terminus of the new line will be the existing 230-kV transmission line that currently terminates approximately 1,200 feet west of the Brunswick EMC Peacock POD located southeast of Chadbourn, North Carolina.

The preferred route for this project extends east from the existing transmission line near Nichols toward the Lumber River, parallel to the existing 115-kV line. The preferred route continues adjacent to the existing line, crossing the state line into North Carolina. A map of the proposed route is attached hereto as Exhibit C.

11. Environmental Assessment. Attached hereto and made a part hereof as Exhibit D, is the "Routing Study and Environmental Report for the Marion Substation-Whiteville Substation 230-kV Transmission Line Project" dated March 2004 and prepared by Burns & McDonnell Engineering Company, Inc.

The environmental report contains a summary of PEC's route selection process, public involvement activities, and the potential environmental impacts of the selected route and alternative routes studied, as well as mitigation measures and the resulting overall impact of the proposed transmission line. Appendices to this report include copies of agency correspondence, public involvement documentation, photographs of typical structures and supporting route analysis information.

In conducting the environmental assessment, PEC examined a study area encompassing approximately 200 square miles and examined 54 alternative route segments that could be combined to form 107 possible line routes for this project.

An extensive inventory of natural and human resources, including topography, soils, hydrology, vegetation, wetlands, wildlife, threatened and endangered plant and animal species, land uses, cultural resources, population, employment and visual character was conducted within the study area.

Each of the alternative routes was evaluated against the potential social and environmental impact based in part on criteria established from the public workshops conducted by PEC.

The preferred route was selected because it would have the least overall social and environmental impacts. The project parallels an existing transmission line, which reduces the required right-of-way and minimizes impacts to agricultural land, woodland and wetlands. The preferred route also has minimal residential impacts compared to most of the other routes.

By following the Company's standard construction practices, the route selection processes described, and utilizing mitigation techniques, most of the potential impacts of the selected route will be either avoided or minimized. As a result, the construction and operation of the proposed project will have minimal effects on the natural and human resources within each study area.

12. Cultural Resources Assessment. As explained in Exhibit D, the routing study and environmental report for the Marion-Whiteville line, Burns & McDonnell archaeologists performed a record search at the South Carolina Institute of Archaeology and Anthropology, University of South Carolina and the North Carolina Department of

Cultural Resources, State Historic Preservation Office, Office of Archives and History and the Survey and Planning Branch. They located a total of 25 recorded archaeological sites, landmarks, and historical structures within the study area, all located in North Carolina. No such sites, landmarks or structures were identified in the South Carolina portion of the study area.

13. Public Involvement Activities - Both Projects. To determine community values relative to the each of proposed projects, the route selection process included two forms of public input. Input was first obtained through meetings with public officials and local agencies, and second, through public information meetings held by PEC. Input was also obtained from the public via information available on the PEC Website. This input was useful in determining the values and attitudes of the residents and public officials regarding the projects, thereby enabling PEC's project team to identify the most appropriate routing criteria to be used to evaluate the routes for each project. The public participation program also provided the public with an understanding of the need for the projects, the decision-making criteria used to select the preferred routes, and a forum to express opinions about the proposed projects.

PEC Community Relations personnel met with city managers and county commissioners and other local officials to notify them of the projects. Burns & McDonnell representatives met with local agency personnel to gather information on new or proposed developments and other constraints in the project areas, including the Florence City/County Planning Department Manager, Florence City/County GIS Department, Town of Quinby Clerk, Marion County Planning Department and Horry County Planning Department.

State and federal agencies were contacted by letter to provide input on permitting issues such as threatened and endangered species, wetlands, forest resources, and cultural resources. Copies of agency correspondence are included in Appendix A to each of the Routing Study and Environmental Reports, Exhibits B and D.

To provide residents of the area with information about the projects and gather public input on each project's route alternatives, PEC held three open-forum informational workshops in February, 2003. The first meeting was held in Florence on February 18th. The second meeting was held in Marion on February 20th. The third meeting was held in Nichols on February 24th. The media and public were first notified of the projects and workshops through a news release about a month prior to the workshops. The workshops were then advertised in The Morning News (Florence), The Dillon Herald, The State (Columbia), The Marion Star & Mullins Enterprise, The Sun News (Myrtle Beach) and The Horry Independent one-week before the workshops. Informational letters describing the projects and advertising the workshops were mailed to all property owners within 200 feet of each of the project alternative routes. Information about the projects, maps of the study areas, and input forms were also available on PEC's Website. Copies of this information are included in the Appendices to each of the Routing Study and Environmental Reports, Exhibits B and D.

The meetings included displays with information on each projects' need, engineering, route alternatives, environmental management, and right-of-way requirements. Representatives from PEC and Burns & McDonnell were present to address the public's questions and take comments. A system map of each of the projects transmission lines and substations currently serving the study areas and an iterative computer program illustrating future power expectations were displayed to help show the

need for each of the projects. Potential routes for each of the proposed transmission lines were depicted on aerial photographs and U.S. Geological Survey (USGS) quadrangle maps. A preferred route had not yet been selected at the time of the workshops. Photographs and drawings showing the types of structures that would be used for each of the projects were displayed. PEC staff discussed right-of-way acquisition and maintenance, and other issues associated with transmission lines.

Participants at the open house received a written questionnaire to communicate their opinions on the routing criteria, the segment locations, preferred route locations, and issues of concern regarding each of the projects. This questionnaire was also available on PEC's project Website. Appendix B to each of the projects' Routing Study and Environmental Reports, Exhibits B and D contains a sample questionnaire and a summary of the responses received to the questionnaires. The results from the questionnaires are discussed in Section 4 of the Routing Study and Environmental Reports, Exhibits B and D.

The questionnaires, personal conversations, letters, petitions, and other comments collected from the workshops provided feedback to the project team on project issues and concerns.

PEC and Burns & McDonnell staff reviewed all public input before evaluating the routes.

Questions 3 and 4 on the questionnaires asked respondents to rank the importance of routing factors as issues of concern in their area or to suggest additional factors of importance to them. The principal concerns regarding each of the projects were proximity to residences, minimizing length across agricultural land and maximizing length along existing transmission lines. Visibility of the line and total length of the line

were the public's lowest priorities. The public's rankings were weighted according to the order in which all respondents prioritized them.

The public input was used in the evaluation through the weighting of the routing criteria and in making the final selection of the preferred route.

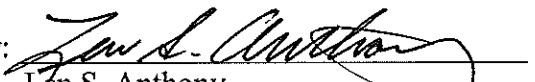
14. Proof of service. Exhibit E, attached hereto and made a part hereof, is proof of service of a copy of this application pursuant to S.C. Code Ann. § 58-33-120(2) on the Chief Executive Officer of each municipality and the head of each state and local government agency charged with the duty of protecting the environment or of planning land use in the area in the county in which any portion of either of the transmission lines is to be located.

15. Public Notice. Attached as Exhibit F, and made a part hereof, is the public notice given to persons residing in the municipalities entitled to receive notice pursuant to S.C. Code Ann. § 58-33-120(3) by publication of a summary of the application, the date on or about which it is to be filed, and the newspapers of general circulation in which such notice was published. This notice served to inform such persons of the filing of this application and proof of notice will be filed with the Commission when received from the various newspapers identified.

WHEREFORE, Progress Energy Carolinas, Inc. respectfully requests that the Commission issue a Certificate of Environmental Compatibility and Public Convenience and Necessity for the projects described herein.

Respectfully submitted this 8th day of April, 2004.

Progress Energy Carolinas, Inc.

By: 

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